



## Light Emission Distribution Laboratory

Division of Photometry & Electrical Testing Pty. Ltd ABN 11 166 255 134

Unit 23, 9 Hoyle Avenue, Castle Hill NSW 2154 Australia

P: +61 2 86264639 E: sales@ledlab.com.au



Accredited for compliance with ISO/IEC 17025 Accreditation No. 19541

# Test Report: 215214

## Testing of LED Streetlight Luminaire Power for AEMO's NEM Load Table and other tests on optical systems

for SL10 MIDI LED BASIC 107W 5000K Model No. 5XA582 3-A1A08

Prepared for: Gerard Lighting Pty Ltd

Request No. PTR 4230

*Type of product:* Category P & V

*Model:* 5XA582 3-A1A08

*Prepared for:* Gerard Lighting Pty Ltd

*Description:* SL10 MIDI LED BASIC 107W IP66 5000K LED Streetlight luminaire.

### Test objective

Determination of the luminaire supply operating parameters Voltage, Current, Power and Power Factor when tested at nominal test voltage of 240V.

### Test configuration

Ten luminaires samples were tested. The luminaires were operated at 25°C ambient temperature until the luminaire parameters stabilised. Twenty readings were taken ten seconds apart and the average found. The average value is multiplied by the Calibration Correction given in the latest NATA calibration report then has Voltmeter losses subtracted based on Watt meter impedance and test voltage.

### Client:

Gerard Lighting Pty Ltd contact Vishal Galchar, 96 Gow St, Padstow, NSW 2211

Tested by: Alain Yetendje on 04/09/2015 Authorised Signatory

Date: 04/09/2015

Alain Yetendje

## Uncertainties

At a Confidence Level of 95% with a Coverage Factor of 2

**Supply Voltage:**  $\pm 0.07\%$

**Supply Current:**  $\pm 0.14\%$

**Supply Power:**  $\pm 0.19\%$

**Power Factor:**  $\pm 0.05$

**Ambient Temperature:**  $\pm 1^{\circ}\text{C}$

## Test Equipment Used

*Power meter:* Clark Hess Model 2335 SN 52164

*Power meter integration time (s):* 5

*Calibration Report:* Ausgrid 220537

*Luminaire thermometer:* AMA S No. 1086110-0.1deg

## Photographs

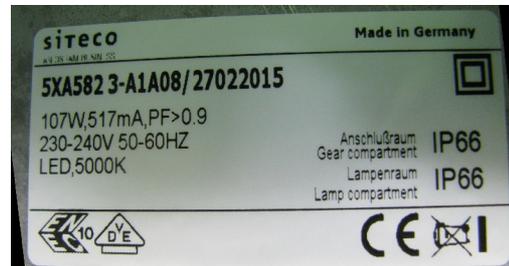
The general construction of the luminaire is shown in the photographs.



*Illustration 1: Luminaire sample*



*Illustration 2: LED driver*



*Illustration 3: Luminaire marking*

## Results

Full details are given in Illustration 4.

### Electrical operating parameters of SL10 MIDI LED BASIC 107W 5000K

Sample No.	Supply Voltage (Vrms)	Input Current (mArms)	Input Power (W)	Power Factor
Sample 1	240.081	454.514	108.17	0.992
Sample 2	239.831	453.044	107.64	0.991
Sample 3	239.969	457.883	108.931	0.992
Sample 4	240.042	452.084	107.534	0.991
Sample 5	239.895	454.396	108.011	0.991
Sample 6	240.038	453.290	107.815	0.991
Sample 7	239.955	453.787	107.914	0.991
Sample 8	240.127	453.901	108.033	0.992
Sample 9	240.055	453.152	107.756	0.991
Sample 10	240.165	456.732	108.720	0.992
<b>Average</b>	<b>239.96</b>	<b>453.78</b>	<b>107.91</b>	<b>0.99</b>

*Illustration 4: Electrical operating parameters of SL10 MIDI LED BASIC 107W 5000K 5XA582 3-A1A08*